



# State of Utah

DEPARTMENT OF NATURAL RESOURCES  
DIVISION OF OIL, GAS AND MINING

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MINERALS PROGRAM  
FILE COPY

October 24, 1989

Mr. Michael H. Gibson  
Director, Environmental Affairs  
Kennecott, Utah Copper  
8362 West 10200 South  
P.O. Box 525  
Bingham Canyon, Utah 84006-0525

Dear Mr. Gibson:

Re: Tentative Approval of Pine Canyon Final Reclamation Plan, Carr Fork Mine,  
M/045/004, Tooele County, Utah

The Division has completed its review of the final reclamation proposal for Kennecott's remaining Pine Canyon mining facilities. The Division supports the overall concept of the reclamation proposal and hereby issues its tentative approval. However, a few technical concerns remain to be resolved prior to issuance of final approval of this reclamation plan.

## TECHNICAL CONCERNS:

### ***R613-004-111.2 Drainages***

***Page 19, Section 4.8, Groundwater*** - The operator has elected not to develop a mine water discharge point from the Carr Fork exhaust/production shaft located in Pine Canyon. The proposed plan indicates that a gravity discharge into Bingham Canyon will be used to control flooding within the abandoned Carr Fork mine workings.

If, as the Carr Fork workings continue to flood, a "natural" discharge from the Pine Canyon Production Shaft becomes apparent, this would be the Division's preferred alternative. It is the Division's opinion that a controlled discharge of good quality water into the Pine Canyon drainage would prove more favorable in terms of supporting the re-establishment of the proposed postmining landuse (wildlife habitat).

In the event that a discharge into Bingham Canyon becomes necessary, then the Division will accept Kennecott's proposal, provided all appropriate clearances and/or permits are obtained from the State Department of Health (BWPC) and the State Engineer's Office.



**Condition #1** (from Division's September 26, 1988 approval)

This condition required Kennecott to provide summarized copies, **at least once every six months**, of all the water level measurements recorded from the Carr Fork production and exhaust shafts. Copies of the water quality analyses for all water samples taken from these shafts was also requested. The last summarized data, as received by the Division, was contained within Kennecott's September 9, 1988 conditional approval response (refer to Table 1, Carr Fork Exhaust Shaft Water Levels). This table indicates that the last water level measurement was taken August 23, 1988. Only one water sample analysis from the Carr Fork Production Shaft was provided, dated June 20, 1988. Kennecott's letter indicated that water level measurements were being taken at the Carr Fork Exhaust Shaft two (2) times per month and once (1) per quarter at the Production Shaft.

The Division requests copies of the summarized water level monitoring results obtained from these shafts over the past 13 months. Any additional ground water quality data which may have been obtained from these shafts should also be provided.

**R613-002-111. Surety**

**Page 25, Section 7.0, Reclamation Cost Estimate** - Kennecott has indicated that a reclamation cost estimate will not be provided to the Division until tentative approval is granted. The operator has also indicated that a self-bond will be sought as the form of reclamation surety.

The Division now requests that the reclamation estimate be provided. A copy of our Reclamation Contract, FORM MR-RC and Form MR-5, Reclamation Bond have been enclosed to assist you in filing your reclamation surety.

**R613-004-112 Variance Requests**

**R613-004-111.8 Roads and Pads**

Kennecott has requested a variance to leave the paved Pine Canyon access road for continued postmining commercial usage and property access. The Division supports and hereby approves of this variance request.

**R613-004-111.9 Dams and Impoundments**

Kennecott has requested a variance to leave the existing Big Springs Dam and concrete flume for continued postmining water rights usage. The Division supports and hereby approves of this variance request.

***R613-004-111.11 Structures and Equipment***

1. Kennecott has requested a variance from reclaiming the Pine Canyon Production Shaft Head Frame. The service and production shafts have already been sealed and the current entrance(s) to the Production Shaft Head Frame will be permanently secured prohibiting future access to the public and/or animals. The Division accepts the operators justification to allow this structure to remain and hereby approves of this variance request.
2. Kennecott has requested a variance to leave the warehouse and truck shop intact for continued commercial postmining landuse. The Division supports and hereby approves of this variance request.
3. Kennecott has requested a variance to leave the water tank and the secondary access road for continued postmining water rights usage. The Division supports the continued long-term usage of these facilities to preserve the operator's appropriated water right, and hereby approves of this variance request.

Thank you for your patience and cooperation in completing this permitting action. Please contact me, Wayne Hedberg or Holland Shepherd should you have questions regarding the content of this letter.

Sincerely,



*for* Lowell P. Braxton  
Associate Director, Mining

DWH/jb  
cc: Bob Bayer, JBR  
Robert Morgan, Water Rights  
Don Ostler, BWPC  
Minerals Team  
MN3/95-97